

#8  
9-17-01RAW SEQUENCE LISTING  
PATENT APPLICATION: US/09/581,005DATE: 08/15/2001  
TIME: 12:40:23Input Set : A:\TGC-1 sequence.txt  
Output Set: N:\CRF3\08152001\I581005.raw

ENTERED

3 <110> APPLICANT: von Eichel-Streiber, Christoph  
4 Chakraborty, Trinad  
6 <120> TITLE OF INVENTION: TGC Method For Inducting Targeted Somatic Transgenesis  
8 <130> FILE REFERENCE: E 52 P2 Wo  
C--> 10 <140> CURRENT APPLICATION NUMBER: US/09/581,005  
C--> 11 <141> CURRENT FILING DATE: 2000-06-06  
13 <160> NUMBER OF SEQ ID NOS: 4  
15 <170> SOFTWARE: PatentIn Ver. 2.1  
17 <210> SEQ ID NO: 1  
18 <211> LENGTH: 1260  
19 <212> TYPE: DNA  
20 <213> ORGANISM: Listeria monocytogenes Strain EGD1/2a  
22 <220> FEATURE:  
23 <221> NAME/KEY: CDS  
24 <222> LOCATION: (241)..(1197)  
25 <223> OTHER INFORMATION: Sequence of the dapE gene, which is essential for  
26 synthesis of diaminopimelic acid.  
28 <400> SEQUENCE: 1  
29 tgccctttata gagaacggga aaacatagag tggaattcat agaaagaggg cgtgaaatat 60  
31 ggaccaacaa aaaaagattc aaattttaaa ggacttggtta aatattgatt cgactaatgg 120  
33 gcatgaagaa caagttgcga actatttgca aaagttgta gctgaacatg gtattgagtc 180  
35 cgaaaaggta caatacgacc tagacagagc tagcctagta agcgaaattg gttccagtaa 240  
37 cga gaa ggt ttg gca ttt tca ggg cat atg gat gta gtt gat gcg ggt 288  
38 Arg Glu Gly Leu Ala Phe Ser Gly His Met Asp Val Val Asp Ala Gly  
39 1 5 10 15  
41 gat gta tct aag tgg aag ttc cca cct ttt gaa gcg aca gag cat gaa 336  
42 Asp Val Ser Lys Trp Lys Phe Pro Pro Phe Glu Ala Thr Glu His Glu  
43 20 25 30  
45 ggg aaa cta tac gga cgc ggc gca acg gat atg aag tca ggt cta gcg 384  
46 Gly Lys Leu Tyr Gly Arg Gly Ala Thr Asp Met Lys Ser Gly Leu Ala  
47 35 40 45  
49 gcg atg gtt att gca atg att gaa ctt cat gaa gaa aaa caa aaa cta 432  
50 Ala Met Val Ile Ala Met Ile Glu Leu His Glu Glu Lys Gln Lys Leu  
51 50 55 60  
53 aac ggc aag atc aga tta tta gca aca gtt ggg gaa gag atc ggt gaa 480  
54 Asn Gly Lys Ile Arg Leu Leu Ala Thr Val Gly Glu Glu Ile Gly Glu  
55 65 70 75 80  
57 ctt gga gca gaa caa cta aca caa aaa ggt tac gca gat gat tta cat 528  
58 Leu Gly Ala Glu Gln Leu Thr Gln Lys Gly Tyr Ala Asp Asp Leu His  
59 85 90 95  
61 ggt tta atc atc ggc gaa ccg agt gga cac aga atc gtt tat gcg cat 576  
62 Gly Leu Ile Ile Gly Glu Pro Ser Gly His Arg Ile Val Tyr Ala His  
63 100 105 110  
65 aaa ggt tcc att aat tat ccc gtt aaa tcc act ggt aaa aat gcc cat 624  
66 Lys Gly Ser Ile Asn Tyr Pro Val Lys Ser Thr Gly Lys Asn Ala His  
67 115 120 125  
69 agt tcg atg ccg gaa tct ggt gtg aat gcg att gat aac ttg ctg cta 672

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70 Ser Ser Met Pro Glu Ser Gly Val Asn Ala Ile Asp Asn Leu Leu Leu
71      130                      135                      140
73 ttt tat aat gaa gta gaa aaa ttc gtg aaa tca gtt gat gct act aac 720
74 Phe Tyr Asn Glu Val Glu Lys Phe Val Lys Ser Val Asp Ala Thr Asn
75 145                      150                      155                      160
77 gaa ata tta ggc gat ttt att cat aat gtc acc gta att gat ggt gga 768
78 Glu Ile Leu Gly Asp Phe Ile His Asn Val Thr Val Ile Asp Gly Gly
79                      165                      170                      175
81 aat caa gtc aat agt atc cct gaa aaa gca caa ctg caa ggg aat att 816
82 Asn Gln Val Asn Ser Ile Pro Glu Lys Ala Gln Leu Gln Gly Asn Ile
83                      180                      185                      190
85 cgc tcg att cca gaa atg gat aat gaa aca gtg aaa caa gtg cta gtg 864
86 Arg Ser Ile Pro Glu Met Asp Asn Glu Thr Val Lys Gln Val Leu Val
87                      195                      200                      205
89 aag att atc aat aag tta aac aaa cag gaa aat gtg aat ctg gaa tta 912
90 Lys Ile Ile Asn Lys Leu Asn Lys Lys Gln Glu Asn Val Asn Leu Glu Leu
91      210                      215                      220
93 ata ttt gat tat gat aaa caa cca gta ttt agt gat aaa aat tcg gat 960
94 Ile Phe Asp Tyr Asp Lys Gln Pro Val Phe Ser Asp Lys Asn Ser Asp
95 225                      230                      235                      240
97 tta gtc cac att gct aag agc gta gca agc gac att gtc aaa gaa gaa 1008
98 Leu Val His Ile Ala Lys Ser Val Ala Ser Asp Ile Val Lys Glu Glu
99                      245                      250                      255
101 atc cca tta ctc ggt att tcc gga aca acc gat gca gca gaa ttt acc 1056
102 Ile Pro Leu Leu Gly Ile Ser Gly Thr Thr Asp Ala Ala Glu Phe Thr
103                      260                      265                      270
105 aaa gct aag aaa gag ttc cca gtg att att ttt gga cca gga aac gaa 1104
106 Lys Ala Lys Lys Glu Phe Pro Val Ile Ile Phe Gly Pro Gly Asn Glu
107                      275                      280                      285
109 acc cct cac caa gta aac gaa aat gtt tct ata gga aat tat ttg gag 1152
110 Thr Pro His Gln Val Asn Glu Asn Val Ser Ile Gly Asn Tyr Leu Glu
111      290                      295                      300
113 atg gta gat gtt tac aaa cgg att gcc acc gag ttt tta tct tga 1197
114 Met Val Asp Val Tyr Lys Arg Ile Ala Thr Glu Phe Leu Ser
115 305                      310                      315
117 tgaaacttta actttactta ttcccgata taaaataagt aattaataga agtctagtat 1257
119 ttg 1260
122 <210> SEQ ID NO: 2
123 <211> LENGTH: 318
124 <212> TYPE: PRT
125 <213> ORGANISM: Listeria monocytogenes Strain EGD1/2a
127 <400> SEQUENCE: 2
128 Arg Glu Gly Leu Ala Phe Ser Gly His Met Asp Val Val Asp Ala Gly
129 1 5 10 15
130 Asp Val Ser Lys Trp Lys Phe Pro Pro Phe Glu Ala Thr Glu His Glu
131 20 25 30
132 Gly Lys Leu Tyr Gly Arg Gly Ala Thr Asp Met Lys Ser Gly Leu Ala
133 35 40 45
134 Ala Met Val Ile Ala Met Ile Glu Leu His Glu Glu Lys Gln Lys Leu

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135      50      55      60
136 Asn Gly Lys Ile Arg Leu Leu Ala Thr Val Gly Glu Glu Ile Gly Glu
137 65      70      75      80
138 Leu Gly Ala Glu Gln Leu Thr Gln Lys Gly Tyr Ala Asp Asp Leu His
139      85      90      95
140 Gly Leu Ile Ile Gly Glu Pro Ser Gly His Arg Ile Val Tyr Ala His
141      100     105     110
142 Lys Gly Ser Ile Asn Tyr Pro Val Lys Ser Thr Gly Lys Asn Ala His
143      115     120     125
144 Ser Ser Met Pro Glu Ser Gly Val Asn Ala Ile Asp Asn Leu Leu Leu
145      130     135     140
146 Phe Tyr Asn Glu Val Glu Lys Phe Val Lys Ser Val Asp Ala Thr Asn
147 145     150     155     160
148 Glu Ile Leu Gly Asp Phe Ile His Asn Val Thr Val Ile Asp Gly Gly
149      165     170     175
150 Asn Gln Val Asn Ser Ile Pro Glu Lys Ala Gln Leu Gln Gly Asn Ile
151      180     185     190
152 Arg Ser Ile Pro Glu Met Asp Asn Glu Thr Val Lys Gln Val Leu Val
153      195     200     205
154 Lys Ile Ile Asn Lys Leu Asn Lys Gln Glu Asn Val Asn Leu Glu Leu
155      210     215     220
156 Ile Phe Asp Tyr Asp Lys Gln Pro Val Phe Ser Asp Lys Asn Ser Asp
157 225     230     235     240
158 Leu Val His Ile Ala Lys Ser Val Ala Ser Asp Ile Val Lys Glu Glu
159      245     250     255
160 Ile Pro Leu Leu Gly Ile Ser Gly Thr Thr Asp Ala Ala Glu Phe Thr
161      260     265     270
162 Lys Ala Lys Lys Glu Phe Pro Val Ile Ile Phe Gly Pro Gly Asn Glu
163      275     280     285
164 Thr Pro His Gln Val Asn Glu Asn Val Ser Ile Gly Asn Tyr Leu Glu
165      290     295     300
166 Met Val Asp Val Tyr Lys Arg Ile Ala Thr Glu Phe Leu Ser
167 305     310     315
171 <210> SEQ ID NO: 3
172 <211> LENGTH: 1337
173 <212> TYPE: DNA
174 <213> ORGANISM: Listeria monocytogenes Strain EGD1/2a
176 <220> FEATURE:
177 <221> NAME/KEY: CDS
178 <222> LOCATION: (795)..(992)
179 <223> OTHER INFORMATION: Sequence of cold shock protein cspL
181 <400> SEQUENCE: 3
182 gaggcaagtg gactaatcat aaagtttttg gcgatgcaac tgcgattttg gcaggagatg 60
184 ctttactaac gctcgctttt tctattttag ctgaagacga taatttatct tttgagacac 120
186 gcattgcttt gattaaccaa attagtttta gtagcgggtc agaaggaatg gttggtggtc 180
188 aacttgcaag cttggaagcg gaaaacaaac aagtgcgctc agaagagtta tcatccattc 240
190 atgcacgaaa aacgggtgaa ttattaattt atgctgtaac ctctgcagca aaaattgcgg 300
192 aagctgatcc agaacaaacg aaacgcttac gaatttttgc agagaatatt gggattggat 360
194 ttcaaattag cgacgatatt ttagatgtaa ttggtgatga aacgaaaatg ggtaaaaaga 420

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196 cagggggccga cgcttttctg aataaaagta cctatcccgg attactcacg cttgatgggg 480
198 caaaaagggc attaaatgag catgttacga ttgcaaagtc agcgctttca gggcatgatt 540
200 tcgatgatga aattctcttg aaacttgctg atttaatcgc acttagagaa aattaatcat 600
202 aattatctag taatttcaaa attttttcac atatataatt caaattgatt tgcttttcct 660
204 aaaataccgt gttatactaa tgtaagatta tttttgtggg tgaaagatac gattgtgaac 720
206 aactttccat ctogtgccgt taagcaagaa tagtaaataa ttagtggtgca taacacacga 780
208 ggaggaacat gaac atg gaa caa ggt aca gta aaa tgg ttt aac gca gaa 830
209 Met Glu Gln Gly Thr Val Lys Trp Phe Asn Ala Glu
210 1 5 10
212 aaa gga ttt ggt ttt atc gaa cgc gaa aac ggt gac gat gta ttc gta 878
213 Lys Gly Phe Gly Phe Ile Glu Arg Glu Asn Gly Asp Asp Val Phe Val
214 15 20 25
216 cat ttc agc gct atc caa ggc gac gga ttc aaa tct tta gac gaa ggt 926
217 His Phe Ser Ala Ile Gln Gly Asp Gly Phe Lys Ser Leu Asp Glu Gly
218 30 35 40
220 caa gca gta act ttc gac gtt gaa gaa ggc caa cgc gga cct caa gca 974
221 Gln Ala Val Thr Phe Asp Val Glu Glu Gly Gln Arg Gly Pro Gln Ala
222 45 50 55 60
224 gct aac gtt caa aaa gcg taattctatt ttttgaataa gaaaaagcaa 1022
225 Ala Asn Val Gln Lys Ala
226 65
228 atcatttcgg tgatttgctt ttttatttgt ctaaaattat tttaccttgt ttggtttaat 1082
230 ggcgattggt tgctataata agaacaatta atcgagaaaa aagaccttgc acgcattcat 1142
232 gcgagtggct ctttggaag tgagttggtt ttatttggat cttttaaga taaaggatcc 1202
234 ttcctttatg aagcgattgg atatacaaga attagaagca cttgcagcgc atattcgcgc 1262
236 ttttttaatt acttctacat ctaaatcagg tgggcatatt ggtccgaatc ttggtgtggt 1322
238 agaactaacg attgc 1337
241 <210> SEQ ID NO: 4
242 <211> LENGTH: 66
243 <212> TYPE: PRT
244 <213> ORGANISM: Listeria monocytogenes Strain EGD1/2a
246 <400> SEQUENCE: 4
247 Met Glu Gln Gly Thr Val Lys Trp Phe Asn Ala Glu Lys Gly Phe Gly
248 1 5 10 15
250 Phe Ile Glu Arg Glu Asn Gly Asp Asp Val Phe Val His Phe Ser Ala
251 20 25 30
253 Ile Gln Gly Asp Gly Phe Lys Ser Leu Asp Glu Gly Gln Ala Val Thr
254 35 40 45
256 Phe Asp Val Glu Glu Gly Gln Arg Gly Pro Gln Ala Ala Asn Val Gln
257 50 55 60
259 Lys Ala
260 65

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VERIFICATION SUMMARY

PATENT APPLICATION: US/09/581,005

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Input Set : A:\TGC-1 sequence.txt

Output Set: N:\CRF3\08152001\I581005.raw

L:10 M:270 C: Current Application Number differs, Replaced Current Application Number  
L:11 M:271 C: Current Filing Date differs, Replaced Current Filing Date